



UNITED STATES PATENT AND TRADEMARK OFFICE

24

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/600,412	06/20/2003	Walter Winkler	1020843-991260	7008

26379 7590 09/23/2005

DLA PIPER RUDNICK GRAY CARY US, LLP
2000 UNIVERSITY AVENUE
E. PALO ALTO, CA 94303-2248

EXAMINER

RODRIGUEZ, JOSEPH C

ART UNIT	PAPER NUMBER
----------	--------------

3653

DATE MAILED: 09/23/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	10/600,412	WINKLER, WALTER	
	Examiner	Art Unit	
	Joseph C. Rodriguez	3653	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 27 July 2005.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-14 and 20-30 is/are pending in the application.
- 4a) Of the above claim(s) 20-30 is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1, 2 and 4-14 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 20 June 2003 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
 Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
 Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| Paper No(s)/Mail Date <u>6/1/04:7/27/05</u> | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Election/Restrictions

Applicant's election without traverse of claims 1-14 in the reply filed on 7/27/05 is acknowledged. With regards to the amended method claims 20-30, it is noted that the related apparatus claims can be used to practice a materially different process (e.g., without the logging of an order), thus these method claims remain distinct.

Claims 20-30 are thus withdrawn from further consideration pursuant to 37 CFR 1.142(b) as being drawn to a nonelected claim grouping, there being no allowable generic or linking claim.

Specification

Claim Objections

Claims 1-14 are objected to because of the following informalities:

Claim 1 should read "An automated storage system" and the claims depending therefrom should read "The storage system".

Appropriate correction is required.

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claims 1, 2, 5-9 and 14 are rejected under 35 U.S.C. 102(b) as being anticipated by Atwater (US 3,661,280).

Regarding claims 1, 5, Atwater teaches an automated storage system for storing and picking articles (Fig. 1-9) comprising a device for separating delivered articles into packing units and transferring the latter onto trays (col. 6, ln. 30-69 teaching the delivering of a packing unit, i.e., stock, into tubs, i.e., trays; and placement of the trays in the storage system), a tray storage facility (12-12e, 18) for storing the packing units on the trays, a retrieval conveying system (16, 24, 26, 30, 32; col. 3, ln. 32 et seq. wherein return of trays can be regarded as a sorting system) for removing and feeding the packing units in sequence for loading onto order load carriers (28), and a loading station (near 28) for loading the packing units in a defined loading sequence onto the order load carriers (col. 3, ln. 62-col. 4, ln. 9).

Regarding claim 2, the contents of one tray is regarded as a "packing unit", thus the tray storage facility has one packing unit situated on each tray.

Regarding claims 6, 8, 9, Atwater teaches that the retrieval conveying system comprises a computer-controlled rack-mounted take-off machine with automated loading of the order load carriers with the packing units (Fig. 1, showing multiple retrieval paths; col. 5, ln. 69-col. 6, ln. 9).

Regarding claim 7, the tray storage facility is regarded as being designed for storing trays of a plurality of defined dimensions as trays of different depths can be stored in the storage bins.

Regarding claim 14, the tray storage facility can be regarded as having storage modules (e.g., different rows or columns) for collating the packing units into article groups. Further, Applicant is respectfully reminded that claim language consisting of functional language and/or intended use phrasing is given little, if any, patentable weight as the apparatus must merely be capable of functioning, or being used, as claimed. See MPEP 2112.02, 2114. Here, the storage facility is certainly capable of collating the packing units into article groups.

Claims 1, 2, 4, 6, 8-9, 12 and 14 are rejected under 35 U.S.C. 102(b) as being anticipated by Lyon et al. ("Lyon")(US 5,733,098).

Regarding claim 1, Lyon teaches an automated storage system for storing and picking articles (Fig. 1-7) comprising a device for separating delivered articles into packing units and transferring the latter onto trays (col. 7, ln. 63 et seq. teaching the delivering of a packing unit via a conveyor 30 and end effectors into trays 55), a tray storage facility (17) for storing the packing units on the trays, a retrieval conveying system (54, 19, 35) for removing and feeding the packing units in sequence for loading onto order load carriers (col. 9, ln. 19 et seq. teaching placement of packing units onto load carriers, i.e., pallets), and a loading station (near 18) for loading the packing units in a defined loading sequence onto the order load carriers (col. 9, ln. 19-60).

Regarding claim 2, the contents of one tray is regarded as a "packing unit", thus the tray storage facility has one packing unit situated on each tray.

Regarding claim 4, Lyon teaches a pallet storage facility (31). Further, Applicant is respectfully reminded that claim language consisting of functional language and/or intended use phrasing is given little, if any, patentable weight as the apparatus must merely be capable of functioning, or being used, as claimed. See MPEP 2112.02, 2114. Here, the storage facility is certainly capable of storing articles on incoming load carriers.

Regarding claims 6, 8, 9, Lyon teaches that the retrieval conveying system comprises a computer-controlled rack-mounted take-off machine with automated loading of the order load carriers with the packing units (Fig. 2a, showing multiple retrieval paths; Abstract).

Regarding claim 12, Lyon teaches tilting the trays so that a packing unit is tilted and then deposited on a subsequent tray (Fig. 3, 5).

Regarding claim 14, the tray storage facility can be regarded as having storage modules (e.g., different rows or columns) for collating the packing units into article groups.

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claim 11 is rejected under 35 U.S.C. 103(a) as being unpatentable over Atwater in view of Jackson et al. ("Jackson")(US 6,139,243).

Atwater as set forth above teaches all that is claimed except for expressly teaching a tray-vibrating device for defined positioning of a packing unit on the tray. Jackson, however, expressly teaches vibrating a tray and, moreover, teaches that vibrating the tray assists in properly positioning the tray contents during handling (col. 3, ln. 52-56). Therefore, it would have been obvious at the time the invention was made to a person having ordinary skill in the art to modify the invention of Atwater as taught above.

Claims 10 and 13 are rejected under 35 U.S.C. 103(a) as being unpatentable over Atwater in view of Bernard, II et al. ("Bernard")(US 4,909,697) and DE 4213351.

Atwater as set forth above teaches all that is claimed except for expressly teaching a load-carrier tilting device for tilting load carriers for the purpose of loading laterally enclosed load carriers and rotating the trays into a defined position. Bernard, however, expressly teaches tilting a load carrier for the purpose of loading another carrier (Fig. 3, 4; Abstract). Moreover, Bernard expressly teaches that tilting is a more convenient method of loading when an operator is involved (Id.). Further, Bernard also teaches a conveyor for rotating the trays into the proper position for a loading device (Fig. 1, near 15, 16) and DE 4213351 further demonstrates that it is well known to use various rotating devices for proper article positioning (Fig. 1, 2). Therefore, it would have been obvious at the time the invention was made to a person having ordinary skill

Art Unit: 3653

in the art to modify the invention of Atwater as taught above to ensure that the tray and/or articles are in the most efficient and proper processing position.

Allowable Subject Matter

Claim 3 is objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

Conclusion

Any references not explicitly discussed above but made of record are considered relevant to the prosecution of the instant application.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to **Joseph C Rodriguez** whose telephone number is **571-272-6942** (M-F, 9 am – 6 pm, EST).

The **Official** fax phone number for the organization where this application or proceeding is assigned is **571-273-8300**.

The examiner's **UNOFFICIAL Personal fax number** is **571-273-6942**.

Further, information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system.

Status information for published applications may be obtained from either Private PMR or Public PAIR. Status information for unpublished applications is available through Private PMR only.

For more information about the PAIR system, see

<http://pair-direct.uspto.gov>

Should you have questions on access to the Private PMR system, contact the Electronic Business Center (EBC) at **866-217-9197** (Toll Free).

Alternatively, inquiries of a general nature or relating to the status of this application or proceeding can also be directed to the **Receptionist** whose telephone number is **571-272-6584**. Further, the supervisor's contact information is Donald Walsh, 571-272-6944.

Signed by Examiner Joseph Rodriguez

jcr

A handwritten signature in black ink, appearing to be 'JR' followed by a long, sweeping horizontal stroke.

September 20, 2005